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Annual Index — 2004

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PREFACE

This annual index of Mathematical Reviews (MR) is included with each subscription and is also available separately. It is also called Volume 36 of the Index of Mathematical Papers (IMP). Volumes 6–9 of IMP are the annual indexes of MR for the years 1974–77 and are available as a set. The 1978 annual index was the first to be included with each subscription. There are cumulative author indexes to MR that cover 1940–59 (Vols. 1–20), 1960–64 (Vols. 21–28) and 1965–72 (Vols. 29–44), subject indexes for 1940–58 (Vols. 1–19) and 1959–72 (Vols. 20–44), and author and subject indexes for 1973–79 (Vols. 45–58) and 1980–84.

The classification scheme used in the present index is the 2000 Mathematics Subject Classification (MSC2000). A copy of the MSC2000 is printed in the back of the subject portion of this index.

The entries in the author, key and subject indexes are comprised of all items reviewed in MR during a given year and some items which will not be reviewed by MR but which have appeared in Current Mathematical Publications (CMP). A star (★) preceding a title indicates a book or other item that is reviewed as a whole.

Author index; separate key index

The entries in the author and key indexes give full bibliographic information. These entries are accompanied by review numbers {if available} and classification numbers; secondary classification numbers are given in parentheses. Entries are listed alphabetically by author; entries having several authors are listed in full under each author. Surnames consisting of more than one part (e.g., de Carvalho, van den Berg) are listed under the first capital letter. Collections of papers, proceedings, bibliographies, tables, etc. that are edited rather than authored are listed in the key index by title and by location of the conference, workshop, etc., when applicable. For example, the publication entitled *Numerical methods and applications* is listed under **Numerical methods and applications** and under the location of the conference. Some monographic series (e.g., American Mathematical Society Translations, Series 2) have entries under the series title in this index.

Arrangement of entries in the author and key indexes

For a given heading (i.e., the preferred name of an author, or a title), full entries are listed in order of nominal publication dates; the cross-references are in MR number order after the full entries. The arrangement of each entry is the same as in the heading of its review in MR. The general form for entries is as follows:

Books, Monographs. (Coauthors {if necessary}) ★Title. (Language of original {if necessary}. Summary languages {if necessary}) [English translation of title or corrected title {if necessary}] Miscellaneous information {edition, editors, translators, series, etc.}. Publisher, city, date. Pagination. ISBN. (Reviewer's name) Review number {if available} Primary classification (Secondary classifications {if necessary}).

Journal article. (Coauthors {if necessary}) Title of article {in English translation if the original title is not in English, French or German}. (Language of original {if necessary}. Summary languages {if necessary}) [English translation of title or corrected title {if necessary}] Journal abbreviation {including series number if necessary} Volume number(volume number in first series {if given}) (nominal date), issue number {if necessary}, pagination (imprint date {if necessary}). (Reviewer's name) Review number {if available} Primary classification (Secondary classifications {if necessary}).

The first five digits of the review number of an item refer to the MR issue in which the review is published and the last five digits refer to its position within that issue. The first two digits after the colon are the general subject classification of the item.

Subject index

The entries in the subject index are arranged in classification order. For a given classification, all entries with that classification as a primary appear first, with authored entries appearing before unauthored entries. These are followed by entries with that classification as a secondary. Again, authored entries appear before unauthored entries. Each section under a given classification is arranged in alphabetical order. For each entry, the author(s), title, language, translated title {if necessary} and the review number {if available} appear at the first author only. The entries for subsequent authors are cross-references to the first author. Complete bibliographic information is available in the annual author and key indexes as well as in the MR review.

Cross-references

There are four kinds of cross-references in these indexes:

Name variations. An author's preferred name is the variation of the name that MR has chosen on the basis of frequency and currency of usage. Items by a given author are usually listed under the author's preferred name. In the author index, cross-references to the preferred form are given from sufficiently distinct alternative forms of the author's name.

Authors in other capacities. In the author index, the names of persons associated with an item in a capacity other than that of author (e.g., editor, translator, subject of a biography, etc.) are also listed. In the subject index, such names appear in parentheses. In both indexes these items occur only as cross-references to complete listings.

Key entries. Cross-references for such entries as bibliographies, obituaries and references to special events are made to the authors of the papers in which these items appear, e.g. **Biography: Artin, Emil** *see* **Roquette, Peter, 2004i:11136**.

Unreviewed entries. Some entries in these indexes have not been reviewed in MR (e.g., items that do not appear to be in final form, or that are at the fringes of MR's scope) although they have been listed in CMP. Unreviewed items appear in the author, key and subject indexes in a format similar to that of reviewed items. For unreviewed items that are part of a collection, the review number in parentheses is a cross-reference to the table-of-contents review, i.e. (see 2004x:xxxxx) or (2004x:xxxxx). For unreviewed items that are not part of a collection, there is no review number cross-reference.

Transliteration

Since 1983, MR has used the Cyrillic transliteration in use by ANSI, LC, Zbl, ISI, and others. This is also the system used throughout this index. A Cyrillic transliteration table appears at the end of the author/key index.

Names of Chinese authors

The name of a Chinese author appears in the index in Western form. For example, Yao Wei Jie will be listed as Yao, Wei Jie, as though the author's name were Wei Jie Yao. The pinyin transliteration is used for mainland Chinese authors and the Wade-Giles transliteration is used for Taiwanese authors.

In an undertaking of this size, errors are inevitable, despite elaborate precautions and checks. The editors of Mathematical Reviews would be very glad to have their attention drawn to errors in this index and also in the earlier indexes.

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Aadland, David Cattle cycles, heterogeneous expectations and the age distribution of capital. (English summary) *J. Econom. Dynam. Control* **28** (2004), *no.* 10, 1977–2002. 91B62 (91A12, 91A80)

Aalen, Odd O. (*with* Gjessing, Håkon K.) A look behind survival data: underlying processes and quasi-stationarity. (English summary) *Mathematical and statistical methods in reliability* (*Trondheim*, 2002), 221–234, *Ser. Qual. Reliab. Eng. Stat.*, 7, *World Sci. Publishing, River Edge, NJ*, 2003. (*see* **2004i:62010**) 62N05

— (*with* Gjessing, Håkon K.; Hjort, Nils Lid) Frailty models based on Lévy processes. (English summary) *Adv. in Appl. Probab.* **35** (2003), *no.* 2, 532–550. (Winfried Stute) **2004e:62178** 62N01 (60B10, 60G51)

van der Aalst, W. M. P. (*with* Kiepuszewski, B.; ter Hofstede, A. H. M.) Fundamentals of control flow in workflows. (English summary) *Acta Inform.* **39** (2003), *no.* 3, 143–209. (Zbigniew Banaszak) **2004d:68088** 68Q60 (68Q85, 90B10, 93C65)

Aamri, Mohamed (*with* El Moutawakil, Driss) Common fixed points under contractive conditions in symmetric spaces. (English summary) *Appl. Math. E-Notes* **3** (2003), 156–162 (*electronic*). (Zdzisław Dzedzej) **2004e:54035** 54H25 (47H10)

— (*with* Attioui, Abdelbaki; Azhari, A.) Itération des polynômes dans une algèbre de Banach. (English summary) [Iteration of the polynomials in a Banach algebra] *Bull. Belg. Math. Soc. Simon Stevin* **10** (2003), *no.* 4, 551–559. (Summary) **2004m:46101** 46G20 (30D05, 37F10, 37F50, 46H99)

Aanes, Sondre (*with* Hirst, David; Storvik, Geir; Huseby, Ragnar Bang; Tvete, Ingunn Fride) Estimating catch at age from market sampling data by using a Bayesian hierarchical model. (English summary) *J. Roy. Statist. Soc. Ser. C* **53** (2004), *no.* 1, 1–14. 62P20 (62D05)

Aarao, Jorge (*with* Martelli, Mario Umberto) Stationary states for discrete dynamical systems in the plane. (English summary) *Topol. Methods Nonlinear Anal.* **20** (2002), *no.* 1, 15–23. (Frederick R. Marotto) **2004b:37077** 37E45 (37C25, 39A11)

Aarão Reis, F. D. A. (*with* Costa, B. S.; Euzébio, J. A. R.) Finite-size effects on the growth models of Das Sarma and Tamborenea and Wolf and Villain. (English summary) *Phys. A* **328** (2003), *no.* 1-2, 193–204. 82C05 (82C24)

Aardal, Karen I. (*with* Lenstra, Arjen K.) Hard equality constrained integer knapsacks. (English summary) *Integer programming and combinatorial optimization*, 350–366, *Lecture Notes in Comput. Sci.*, 2337, *Springer, Berlin*, 2002. 90C10 (90C27)

— (*with* van Hoesel, C. P. M.; Koster, Arie M. C. A.; Mannino, Carlo; Sassano, Antonio) Models and solution techniques for frequency assignment problems. (English summary) *4OR* **1** (2003), *no.* 4, 261–317. (Rainer Burkard) **2004m:90065** 90B80 (90–02)

— *see also* **Integer programming and combinatorial optimization, 2004j:90010** *and* **Algebraic and geometric methods in discrete optimization**

Aarnes, Johan F. (*with* Butler, S. V.) Super-measures and finitely defined topological measures. (English summary) *Acta Math. Hungar.* **99** (2003), *no.* 1-2, 33–42. (Walter Schempp) **2004d:28030** 28C15 (46E27)

— (*with* Grubb, D. J.) Quasi-measures and image transformations on completely regular spaces. (English summary) *Topology Appl.* **135** (2004), *no.* 1-3, 33–46. (Endre Pap) **2004j:28004** 28A10 (46E10)

Aarnes, Jørg (*with* Hou, Thomas Y.) Multiscale domain decomposition methods for elliptic problems with high aspect ratios. (English summary) *Acta Math. Appl. Sin. Engl. Ser.* **18** (2002), *no.* 1, 63–76. (Alessandro Veneziani) **2004h:65128** 65N55 (35J25, 76M10, 76S05)

Aaronson, Jon (*with* Nakada, Hitoshi; Sarig, Omri; Solomyak, Margarita) Corrections to: "Invariant measures and asymptotics for some skew products" [Israel J. Math. **128** (2002), 93–134]. (English summary) *Israel J. Math.* **138** (2003), 377–379. (G. R. Goodson) **2004k:37011** 37A40 (28D05, 37A15)

— (*with* Nakada, Hitoshi) Trimmed sums for non-negative, mixing stationary processes. (English summary) *Stochastic Process. Appl.* **104** (2003), *no.* 2, 173–192. (Dieter H. Mayer) **2004c:60077** 60F15 (37A25, 60G10)

Aarts, E. H. L. (*with* de Kock, E. A.; Verstraten, A. J. E.) Video signal processor scheduling. (English summary) 1999 Philips Workshop on Scheduling and Resource Management (Eindhoven). *J. Sched.* **4** (2001), *no.* 5, 259–270. (Summary) **2004i:90047** 90B35 (94C99)

— (*with* Pruhs, Kirk R.) Editorial: Scharm'01: Selected papers from the 2nd Philips Research Workshop on Scheduling and Resource Management. Held in Eindhoven, June 28–29, 2001. *J. Sched.* **7** (2004), *no.* 2, 103–104. 90–06 (90B35)

— *see also* **Local search in combinatorial optimization** *and* **Workshop: Scheduling and Resource Management**

Aase, Knut K. Representative agent pricing of financial assets based on Lévy processes with normal inverse Gaussian marginals. (English summary) Stochastic equilibrium problems in economics and game theory. *Ann. Oper. Res.* **114** (2002), 15–31. (Summary) **2004a:91054** 91B28

— (*with* Persson, Svein-Arne) New econ for life actuaries. (English summary) With a comment by Hans Bühlmann. *Astin Bull.* **33** (2003), *no.* 2, 117–124. 62P05 (62E10)

Aaserud, Finn Niels Bohr's political crusade during World War II. (English summary) *Mathematics and war* (*Karlskrona*, 2002), 299–311, *Birkhäuser, Basel*, 2003. (Summary) **2004k:01045** 01A70 (01A60, 01A80)

Aasness, Jørgen (*with* Biørn, Erik; Skjerpen, Terje) Distribution of preferences and measurement errors in a disaggregated expenditure system. (English summary) *Econom. J.* **6** (2003), *no.* 2, 374–400. 62P20 (62F10)

Aassila, Mohammed Exact controllability of the Schrödinger equation. (English summary) *Appl. Math. Comput.* **144** (2003), *no.* 1, 89–106. (Luz de Teresa) **2004d:93012** 93B05 (35Q40, 93C20)

— The influence of nonlocal nonlinearities on the long time behavior of solutions of diffusion problems. (English summary) *J. Differential Equations* **192** (2003), *no.* 1, 47–69. (Editors) **2004f:35090a** 35K57 (35A15, 35B40)

— Global existence for a vector-valued nonlinear heat equation. (English summary) *Nonlinear Anal.* **53** (2003), *no.* 5, 619–636. (Snoussi Seifeddine) **2004a:35095** 35K45 (35B05, 35K55)

— Decay of solutions of some nonlinear equations. (English summary) *Port. Math. (N.S.)* **60** (2003), *no.* 4, 389–409. (Márcia Scialom) **2004m:35222** 35Q53 (35B40)

— *see also* **Errata: "On energy decay rate for linear damped systems", 2004c:93107** *and* **Retraction: "The influence of nonlocal nonlinearities on the long time behavior of solutions of diffusion problems", 2004f:35090b**

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Abad, A. (*with* San Juan, J. F.; Serrano Pastor, Sergio) Asymptotic ordering of the terrestrial potential. (Spanish. English summary) *Analytic and numerical techniques in orbital dynamics* (*Spanish*) (*Albarracín*, 2002), 111–120, *Monogr. Acad. Ci. Exact. Fis.-Quím. Nat. Zaragoza*, 22, *Acad. Cienc. Exact. Fís. Quím. Nat. Zaragoza, Zaragoza*, 2003. (Summary) **2004g:70045** 70M20 (70F15)

— (*with* Elipe Sánchez, Antonio C.; San Juan, J. F.; Serrano Pastor, Sergio) Is symbolic integration better than numerical integration in satellite dynamics? (English summary) *Appl. Math. Lett.* **17** (2004), *no.* 1, 59–63. 70M20 (70–04, 70–08)

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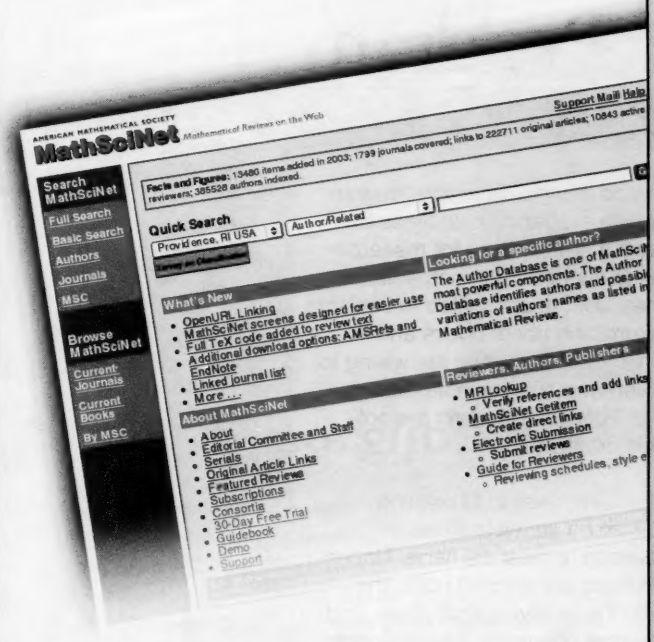
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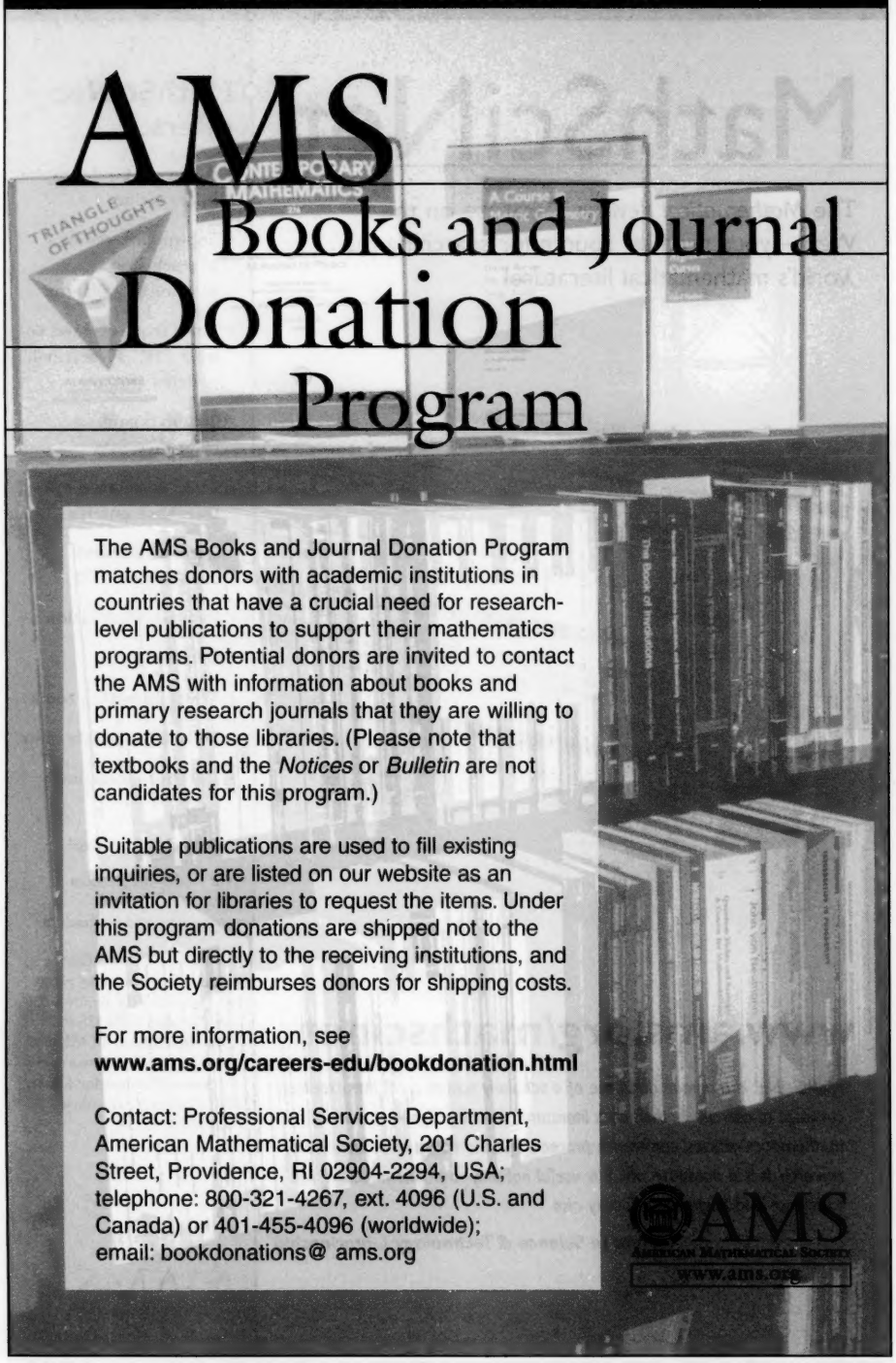
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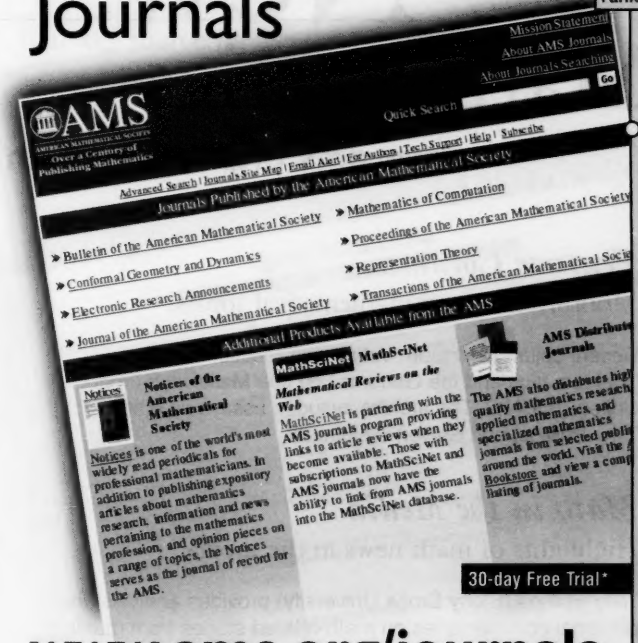
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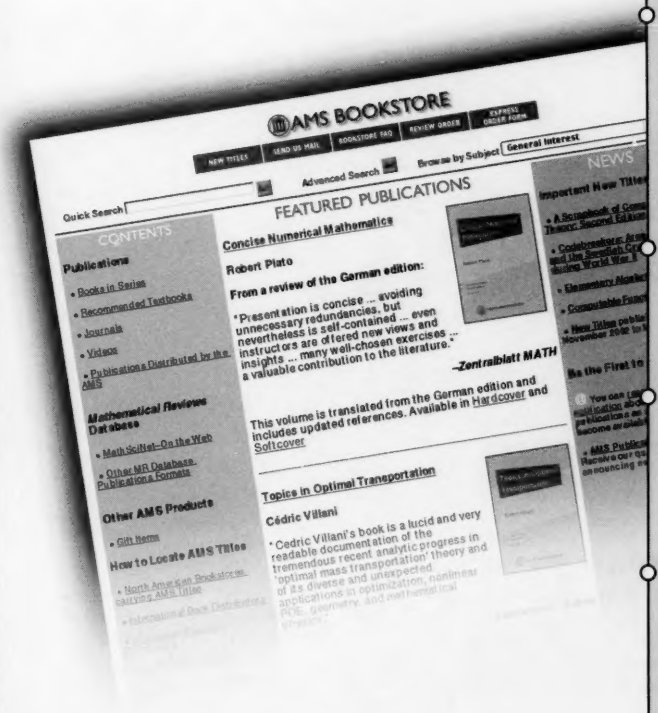


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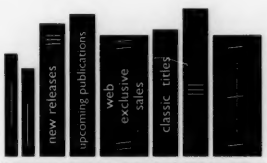
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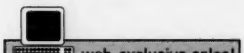
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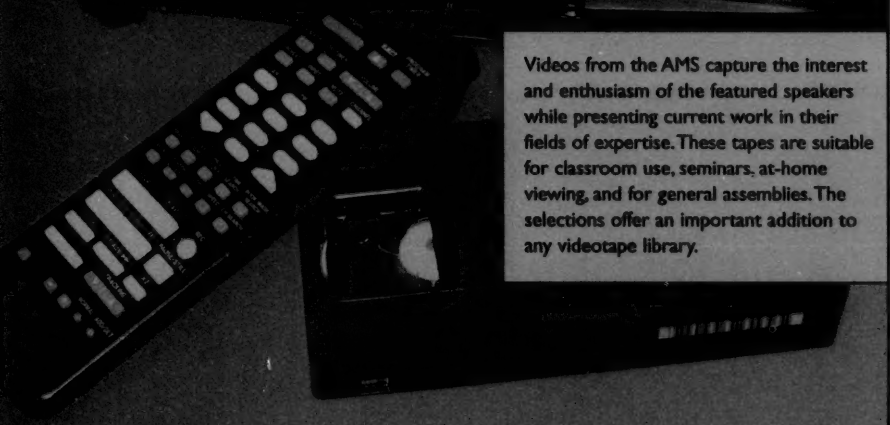


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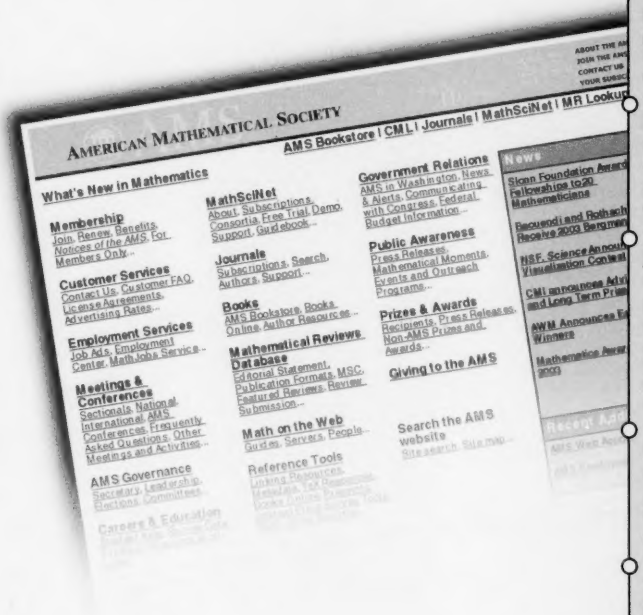
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